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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/672,702

09/25/2003

Manabu Ohga

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08/05/2009

CANON U.S.A. INC. INTELLECTUAL PROPERTY DIVISION

15975 ALTON PARKWAY

IRVINE, CA 92618-3731

EXAMINER

RODRIGUEZ, LENNIN R

ART UNIT

PAPER NUMBER

2625

MAIL DATE

DELIVERY MODE

08/05/2009

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/672,702

Applicant(s)

OHGA, MANABU

Examiner

LENNIN R. RODRIGUEZ

Art Unit

2625

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 07 January 2009 and 29 April 2009.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,3,6,8 and 14-17 is/are pending in the application.
- 4a) Of the above claim(s) 15-17 is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,3,6,8 and 14-17 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Election/Restrictions

1. Applicant's election without traverse of species A in the reply filed on 4/29/2009 is acknowledged.

Response to Arguments

2. Applicant's arguments with respect to claim 1 have been considered but are moot in view of the new ground(s) of rejection. Applicant's newly added limitations such as "obtaining a source profile corresponding to the source device and a destination profile corresponding to the destination device;" raised new issues that require further search from the examiner.

Claim Rejections - 35 USC § 101

3. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

4. Claim(s) 1, 3 and 14 is/are rejected under 35 U.S.C. 101 as not falling within one of the four statutory categories of invention. Supreme Court precedent¹ and recent Federal Circuit decisions² indicate that a statutory "process" under 35 U.S.C. 101 must

¹ *Diamond v. Diehr*, 450 U.S. 175, 184 (1981); *Parker v. Flook*, 437 U.S. 584, 588 n.9 (1978); *Gottschalk v. Benson*, 409 U.S. 63, 70 (1972); *Cochrane v. Deener*, 94 U.S. 780, 787-88 (1876).

² *In re Bilski*, 88 USPQ2d 1385 (Fed. Cir. 2008).

(1) be tied to another statutory category (such as a particular apparatus), or (2) transform underlying subject matter (such as an article or material) to a different state or thing. While the instant claim(s) recite a series of steps or acts to be performed, the claim(s) neither transform underlying subject matter nor positively tie to another statutory category that accomplishes the claimed method steps, and therefore do not qualify as a statutory process. For example, claim 1 identifies a method: obtaining a source profile...; determining a relationship...; determining,...output color data...; these step while being performing the corresponding functionality are not tied to a particular device performing the steps mentioned, making it logical to a person to think it can possibly be performed by hand, mind or a combination.

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 1, 3, 6, 8 and 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Decker et al. (US 6,281,984) in view of Krabbenhöft et al. (US 6,775,030).

(1) regarding claim 1, 6 and 8:

Decker '984 discloses an information processing apparatus (system in Fig. 4) for converting input color data including a plurality of color component data and black

component data into output color data including a plurality of color component data and black component data (column 1, lines 44-49, CMY (plurality of colors), K (black)), the input color data being dependent on a source device and the output color data being dependent on a destination device (column 1, lines 44-49, where CMYK comes from a source profile and the conversion is done based on the printer (destination) profile), the information processing apparatus comprising:

a first section (108 in Fig. 1a) arranged to obtain a source profile corresponding to the source device and a destination profile corresponding to the destination device (column 8, lines 60-62 and column 9, lines 22-25, where the source profile (externally defines CMYK) and the destination profile (given printer) are acknowledged);

a second section (111 in Fig. 1b) arranged to determine a relationship between lightness levels and black color based on the destination profile (column 9, lines 39-46 and 53-58 where the relationship is represented by the graph in Fig. 5); and

a third section (112 in Fig. 1b) arranged to determine, when a black-printing compensation is applied and the input color data indicates black color (column 9, lines 32-34, for example when $C=M=Y=0$ the input indicates simple black), output color data for the simple black color having a lightness level equivalent to a lightness level of the input color data based on the source profile and the determined relationship between lightness levels and black color (column 9, line 60 through column 10, line 2, where the output color based on the printer profile is determined by use of the graphic on Fig. 5, which takes the relationship between lightness level and black color into account),

wherein a value of plurality of color component data included in the input color data determined as the simple black color is 0 (column 9, lines 32-34, for example when $C=M=Y=0$ the input indicates simple black).

Decker '984 discloses all the subject matter as described above except determining, when the black-printing compensation is not applied or when the black-printing compensation is applied and the input color data does not indicate the simple black color, output color data by using the source profile and the destination profile without using the determined relationship between lightness levels and black color.

However, Krabbenhöft '030 teaches determining, when the black-printing compensation is not applied or when the black-printing compensation is applied and the input color data does not indicate the simple black color (column 6, lines 49-54, the input color does not represents simple black), output color data by using the source profile and the destination profile without using the determined relationship between lightness levels and black color (column 6, lines 49-54 and equation (5), where the output color data is determined based only on the source and destination profiles).

Having a system of Decker '984 reference and then given the well-established teaching of Krabbenhöft '030 reference, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the apparatus, method and computer readable medium of Decker '984 to include determine, when the black-printing compensation is not applied or when the black-printing compensation is applied and the input color data does not indicate the simple black color, output color data by using the source profile and the destination profile without using the determined

relationship between lightness levels and black color as taught by Krabbenhöft '030 because the system would perform the printing process adaptation from a first printing process with the color values [C1,M1,Y1,K1] to a second printing process with the color values [C2,M2,Y2,K2] that operates based upon given color profiles for the two printing processes, and with both the visually sensed colors and the black build-up of the first printing process being maintained (column 4, lines 1-10), thus making an almost exact match of the source colors at the destination device.

(2) regarding claim 3:

Decker '984 further discloses wherein the input data and the output data are either simple black colors (column 9, lines 32-34, for example when C=M=Y=0 the input indicates simple black) or achromatic.

(3) regarding claim 14:

Decker '984 further discloses wherein the determination of the relationship between lightness levels and black color includes:

generating, by converting the plurality of the simple black color by using the destination profile, a first conversion condition for converting the black color into the lightness level (column 10, lines 3-16); and

performing an inverse conversion process on the first conversion condition (column 10, line 66 through column 11, line 4, where the values are processed by the inversion/interpolation program 108).

Conclusion

7. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to **LENNIN R. RODRIGUEZ** whose telephone number is (571)270-1678. The examiner can normally be reached on Monday - Thursday 7:30am - 6:00pm EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, King Poon can be reached on (571) 272-7440. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/King Y. Poon/
Supervisory Patent Examiner, Art Unit 2625

/Lennin R Rodriguez/
Examiner, Art Unit 2625